IS 1200 (Part 7): 2013

(Reaffirmed 2018)

भारतीय मानक

भवन निर्माण और सिविल इंजीनियरिंग कार्यों की मापन पद्धतियाँ

भाग ७ हार्डवेयर

(तीसरा पुनरीक्षण)

Indian Standard

METHOD OF MEASUREMENT OF BUILDING AND CIVIL ENGINEERING WORKS

PART 7 HARDWARE

(Third Revision)

ICS 17.020; 91.040.01; 91.190; 93.010

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BUREAU OF INDIAN STANDARDS MANAK BHAVAN, 9 BAHADUR SHAH ZAFAR MARG NEW DELHI 110002

September 2013 Price Group 1

Method of Measurement of Works of Civil Engineering (Excluding Water Resources Development) Sectional Committee, CED 44

FOREWORD

This Indian Standard (Part 7) (Third Revision) was adopted by the Bureau of Indian Standards, after the draft finalized by the Method of Measurement of Works of Civil Engineering (Excluding Water Resources Development) Sectional Committee had been approved by the Civil Engineering Division Council.

Measurement occupies a very important place in the planning and execution of any civil engineering work from the time of first estimates to the final completion and settlement of payments for a project. Methods followed for measurement are not uniform and considerable differences exist between practices followed by different construction agencies and also between various Central and State Government departments. While it is recognized that each system of measurement has to be specifically related to administrative and financial organizations within a department responsible for the work, a unification of various systems at technical level has been accepted as very desirable, specially as it permits a wider range of operation for civil engineering contractors and eliminates ambiguities and misunderstandings of various systems followed.

Among various civil engineering items, measurement of buildings was the first to be taken up for standardization and this standard having provisions relating to building work was first published in 1958 and then revised in 1964 and 1972.

Since various trades are not related to one another, the Sectional Committee decided that each type of trade as given in IS 1200: 1964 'Method of measurement of building works' be issued separately as different parts which will be helpful to specific users in various trades. This Part of IS 1200 covering hardware was first issued in 1972.

This third revision of the standard has been brought out to incorporate the changes found necessary in light of usage of this standard and suggestions made by various implementing bodies. The significant modifications in this revision are:

- a) Incorporation of Amendment No. 1 and 2;
- b) Revised provision on mode of measurement of fixing the hardware items in 2.5; and
- c) Revised provision on mode of measurement of hardware fixed flush in 2.7.

SP 27: 1997 'Handbook on method of measurement of buildings works (*first revision*)' published earlier by the Committee covering the consolidated provisions of all the Parts of IS 1200 shall be revised after the revision of the other Parts of IS 1200.

For standards on method of measurement of river valley projects, the Indian Standards formulated by the Measurement and Cost Analysis of Works for River Valley Projects Sectional Committee, WRD 23 under the Water Resources Division Council of BIS may be referred.

For the purpose of deciding whether a particular requirement of this standard is complied with, the final value, observed or calculated, expressing the result of a measurement shall be rounded off in accordance with IS 2:1960 'Rules for rounding off numerical values (*revised*)'. The number of significant places retained in the rounded off value should be the same as that of the specified value in this standard.

Indian Standard

METHOD OF MEASUREMENT OF BUILDING AND CIVIL ENGINEERING WORKS

PART 7 HARDWARE

(Third Revision)

1 SCOPE

This standard (Part 7) covers the method of measurement of hardware in buildings and civil engineering works.

2 GENERAL

2.1 Description of Item

The description of each item shall, unless otherwise stated, be held to include wherever necessary, conveyance and delivery, handling, unloading, storing and all labour for fitting and fixing in position, cutting and waste, return of packing, etc.

2.2 Limits of Measurement

The dimension shall be measured net in decimal system nearest $0.01\ m.$

2.3 Bills of Quantities

The bills of quantities shall fully describe the materials and workmanship and accurately represent the work to be executed.

2.4 Mode of Measurements

The various kinds of builders hardware shall be described and measured separately according to the

material, finish, size, pattern and method of fixing.

- **2.4.1** All builders hardware shall be fully described and enumerated except the following which shall be measured, in running metres.
 - a) Curtain rods or poles, stating the outer diameter:
 - b) *Curtain Rails* Curtain runners, brackets and stops shall be described and included with the item stating the number per metre of rail;
 - c) Rails for sliding sashes stating the size of the rail; and
 - d) Sash Lines The girth or diameter shall be stated.
- **2.5** Fixing of hardware items shall include all labours for fittings, cutting, sinking, boring and morticing, the supply of screws (or bolts, nuts and washers in the case of hardware made for fixing with bolts), to match.
- **2.6** Hardware fixed to wood and metal shall each be measured separately.
- **2.7** Hardware fixed flush shall be so described, and measured separately.

3 MEASUREMENT OF SIZES OF HARDWARE

3.1 The sizes of the hardware articles (*see* **2.4**) shall be measured as indicated in Table 1.

Table 1 Measurement of Hardware

(*Clause* 3.1)

Sl No. (1)	Name of Article (2)	How Measured (3)
i)	Bolts	a) The length of face plate in flush bolts
		b) The length of shoots (bolt) in other bolts
ii)	Hinges	a) The length of the joint or knuckle of butt hinges
		b) The width between flanges and also the height of parliament hinges
		c) The length of the leaf (that is, from the joint or knuckle to the point), in case of tee and strap hinges
		d) The length of the spring cylinder for regulating spring of butt hinges
		e) The length of joint in case of back flap hinges
		f) The length of continuous (piano) hinges
iii)	Latches (Suffolk or Norfolk)	The dimensions of the plate (having the bow handle) and the size number

Table 1 — (Concluded)

(1)	(2)	(3)
iv)	Latches, rim (Night)	
v)	Locks, rim	
vi)	Locks, mortice	The horizontal length of face across the body excluding the box staple or striking plate
vii)	Locks, cabinet or cup board	
viii)	Locks drawer	
ix)	Locks furniture	The maximum diameter of the knob
x)	Cleats belaying	Straight distance between two ends of cleat
xi)	Catches, spring (for fan light)	The flat overall size in elevation of the plate with spring catch excluding the striking plate
xii)	Fasteners cockspur	The length of handle from the centre of pivot or hinged joint
xiii)	Fasteners and stays (casement)	Extreme length including thickness of back plate
xiv)	Pivots and sockets	The dimensions of each plate
xv)	Stays, quadrant (for fanlight)	The shortest straight length between the extreme ends of the quadrant stay
xvi)	Brackets for shelving	The extreme width and height
xvii)	Door handle	Grip length
xviii)	Hat pegs	Extreme length including thickness of plate
xix)	Hat and coat hooks	Measured diagonally from extreme top of fixing plate to the extreme top of knob
xx)	Wardrobe hooks	Measured diagonally from extreme top of fixing plate to the extreme top of knob
xxi)	Screw hooks dresser or cup	Straight length excluding screwed end
	pattern	
xxii)	Cabin or casement hook with two eyes on plate	Straight length between centre of two eyes when fixed
xxiii)	Wire hooks with two screwed eyes	The overall length of the hook excluding the screwed eye. The diameter of wire shall be stated
xxiv)	Knob	The maximum diameter of the knob
xxv)	Hasp and staples:	The maximum diameter of the know
AAT)	a) Wire type	The overall length of hasp including the hinged plate
	b) Plate type	The length measured from the centre of the hinge to the end of the hasp excluding the hinged
	o) Thate type	plate
xxvi)	Strips, rat-tail including friction	P.M.C
11.11)	plate	Length measured from the centre of the spindle to the centre of the roller
xxvii)	Spring, patent helical	2 Zengui metalated from the country of the spinale to the country of the forms
xxviii)	Screwed eyes	The overall length of the screwed eye and diameter of wire shall be stated
xxix)	Door closer (hydraulically	The weight and the width of the door to which it is intended to be fitted shall be stated
,	regulated and pneumatically regulated) including concealed ones	
xxx)	Finger plate	The length, width and thickness of the plates
xxxi)	Sliding door bolt (Aldrop)	Length of the bolt
xxxii)	Floor door stopper with plate	Length of its plate
xxxiii)	Hooks and eyes	Length of the hook measured out to out

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Amendments Issued Since Publication

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BUREAU OF INDIAN STANDARDS

Headquarters:

Manak Bhavan, 9 Bahadur Shah Zafar Marg, New Delhi 110002

Telephones: 2323 0131, 2323 3375, 2323 9402 Website: www.bis.org.in

Regional Offices:	Telephones
Central : Manak Bhavan, 9 Bahadur Shah Zafar Marg NEW DELHI 110002	$\begin{cases} 2323 & 7617 \\ 2323 & 3841 \end{cases}$
Eastern : 1/14 C.I.T. Scheme VII M, V. I. P. Road, Kankurgachi KOLKATA 700054	$\begin{cases} 2337 8499, 2337 8561 \\ 2337 8626, 2337 9120 \end{cases}$
Northern : SCO 335-336, Sector 34-A, CHANDIGARH 160022	$ \begin{cases} 260 & 3843 \\ 260 & 9285 \end{cases} $
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